



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

REGION 4
ATLANTA FEDERAL CENTER
61 FORSYTH STREET
ATLANTA, GEORGIA 30303-8960

OCT 1 2007

Mr. Onis "Trey" Glenn, III, Director
Alabama Department of Environmental Management
1400 Coliseum Boulevard
Montgomery, Alabama 36110-2059

Dear Mr. Glenn, III:

Thank you for asking the United States Environmental Protection Agency (EPA) to participate on the Cancer Risk Advisory Panel (Panel) requested by the Environmental Management Commission (EMC). At our first meeting, a series of 33 questions were posed by the EMC to the Panel covering a broad array of topics. EPA examined these questions and submits the enclosed responses to those questions which were directly relevant to EPA's statutory and regulatory responsibilities.

EPA is aware that many of the Panel members will be submitting responses to these and other questions and that the Department of Environmental Management will be presenting these responses to the EMC in the near future in consideration of possible changes to the cancer risk value for the State's water quality standards. Should you need any further assistance from EPA in this matter, please feel free to contact me at (404) 562-9274.

Sincerely,

A handwritten signature in black ink, which appears to read "Joel Aaron Hansel", is written over a large, light-colored circular stamp or watermark.

Joel Aaron Hansel, MPH
National Expert in Human Health Criteria
and Public Health Issues
U.S. EPA, Region 4

EPA Responses to Applicable EMC Questions on Cancer Risk

1. Do you have any facts/information that may be useful to the EMC as they evaluate this policy decision?

Response: EPA has some information that is relevant to the policy decision at hand. This information is presented in the responses to the applicable questions from the EMC presented below.

2. Do you have an opinion/recommendation to offer as to whether or not the EMC should change the Cancer Risk factor used in the equation?

Response: EPA has no opinion or recommendation on whether or not the EMC should change the risk factor. However, EPA does recommend that ADEM and the EMC review our current guidance on the derivation of ambient human health criteria (<http://www.epa.gov/waterscience/criteria/humanhealth/method/index.html>) to ensure that any change is consistent with this guidance.

3. Please explain the EPA process and expected outcome for any requests to use “alternative methods” for determining the final concentrations for carcinogens on the list. For example, does EPA approve “alternative methods” anymore or feel it is likely that any such request would be denied?

Response: EPA interprets this question to be with respect to any “alternative method” for computing human health criteria. Any method that is different from EPA’s current recommended guidance cited in the response to Question #2 would need to be submitted to EPA as a change to water quality standards consistent with Section 303(c) of the Clean Water Act. EPA would then review the submission to determine if it is scientifically defensible and, if so, would approve such a method. If the method were found to not be scientifically defensible, then EPA would disapprove the change to the water quality standards and it would not be in effect for Clean Water Act purposes ie., NPDES permitting, assessment of water quality monitoring data, water quality certification, etc. EPA would actively work with ADEM, the EMC, and other stakeholders during the state adoption process in an effort to ensure that any “alternative method” is acceptable.

13. Please provide a review of the **steps and reasoning** leading to this policy change in the Region 4 states currently using 10^{-6} .

Response: EPA has no knowledge that states in Region 4 made a policy change from 10^{-5} to 10^{-6} since the inception of the water quality standards program. The states that have 10^{-6} as the cancer risk level started with that value for any number of reasons, including but not limited to, this represents the middle of EPA’s acceptable range of risk values (10^{-5} to 10^{-7}), EPA publishes its Section 304(a) criteria recommendations at the 10^{-6} level, and this was found to be an acceptable risk to the state and the public within said state.

14. What is the *statewide impact* (positive or negative) environmentally, economically, and medically seen in the Region 4 states currently using a cancer risk factor of 10^{-6} ?

Response: EPA does not track this type of information and therefore, cannot provide any insight to actual impacts.

18. Is the current process for determining water quality standards required by our regulations consistent with our legislative authority in the Alabama Environmental Management Act and EPA guidance?

Response: To the best of our knowledge, the current process that the state uses for determining and adopting water quality standards is consistent with both EPA guidance and the Federal regulations governing water quality standards adoption found at 40 CFR 131.

23. What will be the challenges for complying with any change to the standards based on going to a 10^{-6} risk level and how much time is reasonable to allow permit holders to make any necessary changes to their processes or discharge treatment?

Response: EPA believes that the biggest challenge will be changing any permit limits affected by this revision in that the number of permits to be changed may be relatively large. Further information on this aspect can be obtained from the water permitting staff at ADEM. As to what constitutes a reasonable amount of time to allow permittees to comply with any new standards, the Federal regulations allow for a compliance schedule that sets out the milestones and time frames under which a permittee must comply with any new water quality standard. The time frame is determined on an individual basis and is the shortest amount of time that is needed in order to comply. ADEM regulations may vary from this and should be consulted in order to assure compliance with the applicable regulation.